

COMMENTS OF THE COOK COUNTY STATE'S ATTORNEY'S OFFICE

By William Steinhurst of Synapse Energy Economics, Inc.

The Cook County State's Attorney's Office ("CCSAO") submits the following comments regarding the Staff of the Illinois Commerce Commission's ("Staff") third revised draft of the distributed resource interconnection rule. Although CCSAO addresses only two of the six questions presented, CCSAO considers all of the questions important to the development of distributed generation in Illinois.

Question 2. The draft rule essentially fast tracks proposed interconnections that pass the Primary and/or Secondary Screening Criteria. If a unit fails the Primary and Secondary Screening Criteria, then the interconnection provider has much greater discretion over, the need for, and scope of, additional studies and, ultimately, approval of the interconnection application. What can be done to better define the decision criteria that interconnection providers employ when evaluating proposed interconnections that fail both screens? What can be done to add more certainty to the process, so the interconnection customer does not face a "black box" of potential costs and extended timeframes?

CCSAO views the "black box" issue as an important concern and hopes it can be ameliorated. However, at this time, CCSAO has no specific solutions.

Question 6. Provide any other comments that are not related to specific sections of the Draft.

A. General Comments in support of a process enabling development of distributed generation.

This draft proposed rule is an important part of the process enabling development of distributed generation ("DG") and a competitive electric market. It is very easy to delay or derail a DG project at the stage of finalizing interconnection with the grid, deliberately or otherwise, through a variety of tactics or through sheer bureaucratic inertia and clumsiness. Concerns about prompt, fair and predictable treatment can arise on the part of developers concerning interconnection procedures and requirements at both the utility and the Commission. Since interconnection approval often is one of the last things to happen in the DG development process, developers are appropriately cautious of working in jurisdictions lacking fair and clear interconnection rules. Therefore, such fair and clear rules will be critical to timely development of meaningful amounts of DG in Illinois.

DR development would also benefit the wholesale power market to the extent that it adds to generation supply in the local control areas of Illinois. Environmental impacts would depend

on the technologies chosen, the fuels used, the amount of DR energy produced, and the regional resources displaced. Solar panels and wind would reduce environmental impacts. Natural gas driven DG would probably displace emissions from older, less efficient and dirtier utility generation, even more so if it involved cogeneration and also displaced on site fuel use. Storage technologies could be environmentally neutral or could increase air emissions for two reasons: first, they use more electricity to store energy than they produce when energy is withdrawn and, second, they could displace expensive (but relatively clean) natural gas generation on-peak, while increasing use of nuclear, coal or oil generation off-peak. CCSAO is not aware of any specific studies of the issue of environmental impacts of storage operation.

Lastly, industrial and large commercial DG units can be tens or, more rarely, a hundred or so MW in capacity and may operate as baseload units if off-peak power prices justify it. In sufficient quantity they could defer or displace the need for new utility baseload plants. To the extent that DG units are cogenerators, they could do so without imperiling natural gas supply. In sum, CCSAO considers the advancement of DG as important for Illinois. This draft proposed rule is an important part of that process.

B. General Comments on various provisions of the proposed draft Rule.

The proposed Rule is helpful since it actually covers distributed resources ("DR"), which includes more than DG. For example, energy storage devices are explicitly included by definition in the proposed Rule. The proposed Rule defines DRs as "equipment that can become a source of electric power, including but not limited to generators and/or energy storage technologies." Sec. XXX.010. Storage technologies, including battery banks, super conducting rings (still speculative), compressed air storage (proven in demonstration projects but infrequently deployed), and pumped hydro (routine but hard to site), can be of considerable value if the price spread between on- and off-peak hours justifies the capital investment. DR is also used elsewhere to include efficiency and load control technologies, but the proposed rule does not seem to address those options.

The draft proposed rule also has other sound features. For example, one very progressive feature is associated with the definition of a Facilities Study. Such a study is an engineering assessment of what changes are needed to the grid to accommodate a proposed DR unit. Since the costs of such upgrades can be large and may not be known to the developer until after all its design and application work is done, they are a big issue and a risk for the developer. The draft requires the utility to provide suggestions for changes to the DR unit that would reduce the cost of the grid upgrade. Sec. XXX.010 "Facilities Study." Such changes can be much cheaper than grid upgrades. This requirement is an excellent addition to the usual interconnection rule.

Another good feature is the proposed rules' incorporation and reliance on the new IEEE 1547-2003 standard for interconnection of small DG units, which adds greatly to the certainty for developers. For small enough DG units imposing only a small enough short circuit current and located on distribution circuits, there would be no upgrades and compliance with the IEEE standard is all that is required. Sec. XXX.070. This would apply, for example, in many situations to photovoltaic panels and micro turbines and greatly simplify the application process. For larger

units still on distribution circuits, necessary upgrades are given (at the developer's option) with a binding quote for the upgrade cost, a very helpful provision. Sec. XXX.090. For larger, more complex projects, there are provisions to ensure that the process of determining needed upgrades is fair and reasonably prompt. Sec. XXX.010. From a procedural point of view, the correct steps appear to be present and appropriate timelines and other safeguards for developers provided. Sec. XXX.110-130. The main concerns would be fair play during those steps and lack of advance clarity on study costs. The costs and complexity have the potential to escalate rapidly for larger projects or projects connected at higher voltages.

Another positive feature is the clear and tight timelines for utility review of applications for receipt (3 days) and completeness (a further 10 days), initial review (a further 15 days), and identification of problems or needed upgrades (a further 10 days). *See*, Flow Chart provided with draft Rule. It is also helpful that the developer is provided with opportunities to cure any shortcomings in the application rather than starting over again, and that fees for processing applications are prohibited and the requirement for a specific tariff for initial review costs. Sec. XXX.060. (These timelines are subject to a best efforts escape clause. Sec. XXX.150.) An excellent provision from the standpoint of competition is the prohibition on the utility using data from applications to propose competing proposals or to institute electric power discounts to the applicant to head off the project. *See* Sec. XXX.050, generally, for most of this paragraph.

There is an exemption from metering for units under 100 kW Sec. XXX.160. Turn around time for interconnection must be no more than 18 months from completion of the application process on the applicant's side, although this section is very confusing and even appears to be internally inconsistent. Sec. XXX.170.

In summary, the draft rules have a few issues that should be further clarified and a few substantive concerns, but on the whole are very supportive of DR development.